Discovery and these sources of drift pumices interbedded in coastal sediments at Sekinehama, in the northern part of Shimokita peninsula, Aomori prefecture

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Pumice, one of the pyroclastic materials, may start drifting in the sea for some reason and be carried to distal places by the tide. Pumice which started drifting is assumed to, lost its buoyancy due to the attachment of marine life or the filling of water in the pores, except the case that it is launched to the coast (Kato, 2009), and such pumice is called "drift pumice". Shiraishi et al. (1992) reported that drift pumices of Aso-4 pyroclastic flow deposits and Sambe-Kisuki pumice fall deposits existed in the upper Quaternary in Oga peninsula. In addition, 7 to 10 thousand years ago when Aso-4 and SK erupted, the possibility that there was an ocean current northward of the Sea of Japan was mentioned. Pumice drifts under the influence of topography and ocean current. Thus, drift pumice in the strata can be evidence of estimate paleoenvironment at the time of drifting.In this study, we conducted field surveys at Sekinehama in the northern part of the Shimokita Peninsula and found several drift pumices. Furthermore, here we report that the drift pumices are erupted from Ulleung island (U-2) and Towada volcano (To-Cu), which are correlated based on the major-element composition of pumices, and crosschecked by 14C dating of humus under the drift pumice layer.

Keywords: drift pumice, Towada-Chuseri (To-Cu) tephra, Ulleungdo, Shimokita peninsula